

Amendments to the Claims:

DT04 Rec'd PCT/PTO 18 OCT 2004

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1. (original) A device for measuring at least the pressure of a fluid present in a chamber (16), said device comprising a sensitive element (36) placed in a housing (38) borne by a seal (10) interposed between two elements (12, 14) forming said chamber, characterized in that housing (38) is open in the direction of chamber (16) and sensitive element (36) is coated with a material (67) filling said housing.
2. (original) A measuring device as claimed in claim 1, characterized in that seal (10) comprises a pile of two extreme sheets (32, 34) between which a multiplicity of intermediate sheets (42, 48, 50, 52, 54) is arranged and housing (38) is delimited by said extreme sheets and at least one intermediate sheet.
3. (original) A measuring device as claimed in claim 2, characterized in that at least one intermediate sheet comprises a cut (40) open in the direction of chamber (16).
4. (currently amended) A measuring device as claimed in claim 2-~~or~~-3, characterized in that at least one intermediate sheet (48, 54) comprises electric connection means (58, 59, 60) between sensitive element (36) and a measuring means.
5. (original) A measuring device as claimed in claim 4, characterized in that electric connection means (58, 59, 60) are borne by an intermediate sheet in form of a film

(48, 54) on which a printed circuit comprising at least one electric conductor (60, 63) between sensitive element (36) and the measuring means is formed.

6. (currently amended) A measuring means as claimed in claim 2~~any one of claims 2 to 5~~, characterized in that the sheets are electrically insulated from one another by at least one sheet in form of a plate, layer or insulating deposit (50, 52).

7. (currently amended) A measuring device as claimed in claim 4~~any one of claims 4 or 5~~, characterized in that two of the opposite vertical faces of sensitive element (36) are connected to the electric connection means.

8. (currently amended) A measuring device as claimed in claim 4~~any one of claims 4 or 5~~, characterized in that two of the opposite horizontal faces of sensitive element (36) are connected to the electric connection means.

9. (currently amended) A measuring device as claimed in claim 4~~any one of claims 4 to 8~~, characterized in that sensitive element (36) is connected to the electric connection means by a conducting glue (64).

10. (currently amended) A measuring device as claimed in claim 4~~any one of claims 4 to 9~~, characterized in that sensitive element (36) is connected to the electric connection means by at least one conducting element (66).

11. (currently amended) A measuring device as claimed in claim 2~~any one of claims 2 to 6~~, characterized in that the sheets are joined together by glueing.

12. (original) A measuring device as claimed in claim 11, characterized in that glueing is carried out by interposing a glue layer (56).

13. (original) A measuring device as claimed in claim 2, characterized in that at least extreme sheets (32, 34) are made of metal.

14. (currently amended) A measuring device as claimed in claim 2-to-6, characterized in that at least central sheet (42) of the intermediate sheets is made of metal.

15. (original) A measuring device as claimed in claim 1, characterized in that the material (67) filling housing (38) is a resin withstanding high temperatures.

16. (currently amended) A measuring device as claimed in ~~any one of claims~~ claim 1 to-3, characterized in that face (57) of the housing in the direction of the chamber is covered with a protective element (68).

17. (original) A measuring device as claimed in claim 16, characterized in that protective element (68) comprises a wall covering face (57) and the ends of said wall are folded back over extreme sheets (32, 34) of the seal.

18. (original) A measuring device as claimed in claim 1, characterized in that sensitive element (36) is of piezoelectric or piezoresistive type.

19. (currently amended) A measuring device as claimed in claim 1~~any one of the previous claims~~, characterized in that seal (10) is a cylinder head gasket arranged between cylinder head (12) and engine block (14) of an internal-combustion engine.

20. (original) A measuring device as claimed in claim 1, characterized in that the seal comprises a temperature-sensitive element.

21. (currently amended) Application of at least one measuring device as claimed in ~~any one of claims~~ claim 1 to 19 to engine knock measurement, detection and analysis in the combustion chamber of an internal-combustion engine.

22. (currently amended) Application of at least one measuring device as claimed in ~~any one of claims~~ claim 1 to 19 to combustion characterization in at least one combustion chamber of an internal-combustion engine.

23. (currently amended) Application of at least one measuring device as claimed in ~~any one of claims~~ claim 1 to 19 to engine knock location in the combustion chamber of an internal-combustion engine.